ABSTRACT OF THE DISCLOSURE

Martensitic stainless steel whose steel composition is restricted within a specific range for each element is provided. The scale layer formed on the surface of the base material consists of an inner layer scale mainly including FeCr₂O₄ and an outer layer scale having a thickness of not more than 20 μm, which outer layer is deposited on the inner layer scale at a surface coverage of not less than 1% and not more than 15%. The application of rust preventive oil onto the surface of the steel ensures an excellent weather resistance during a long term, and therefore a martensitic stainless steel forming no rust either in the outdoor depository or in the indoor depository can be provided. The steel can be used to manufacture, not only steel pipes, but also steel plates, steel rods and others in a wide application field.